

April 18, 2006

Mr. Jeff Newschwander Toxics Cleanup Program Washington State Department of Ecology 15 W. Yakima Avenue, Suite 200 Yakima, WA 98902

RE:

VOLUNIARY CLEANUP ACTION
PARISEAU FARMS SITE
OKANOGAN COUNTY, WASHINGTON

CK# 1470900 5/23/00



Dear Mr. Newschwander:

The attached voluntary cleanup action forms are being submitted in support of a request for a No Further Action determination for the Pariseau Farms Dump Site, Ecology Site Identification No. 425, located in Okanogan County, Washington. The site is located north of the town of Brewster in the northwest quarter of Section 12, Township 30 North, Range 24 East Willamette Meridian (Figure 1). In 1991, the Washington State Department of Ecology (Ecology) conducted a site hazard assessment due to dumping that reportedly occurred at the site. As a result of the assessment, Ecology listed the site on the Hazardous Sites List with a hazard ranking of 2. In 2004, Ecology completed adjustments to the Hazardous Sites List, and subsequently assigned a ranking of 1 to the site. A brief summary of the site hazard assessment, as well as an evaluation of site conditions compared to current regulatory levels, is presented below.

SITE ASSESSMENT

In April 1991, Ecology conducted a site hazard assessment to investigate the presence of contamination in soil due to unauthorized dumping that occurred within a steep ravine located on the site. The dump site and ravine are located on a south-facing hillside within a large expanse of apple orchards. The elevation of the site is approximately 1,120 ft above mean sea level (MSL), and depth to groundwater beneath the site has been estimated at approximately 150 ft below ground surface (BGS)

During the site hazard assessment, two soil borings were drilled to depths of approximately 10 ft BGS. One boring (PFB-01) was drilled within the disposal site, and one (PFB-02) was drilled within the ravine immediately below the disposal site. One soil sample was collected from each boring (PFB-01-005 0S and PFB-02-009 0S) and one grab sample (PFG-01-001 0S) was collected from shallow soils in the ravine further south of the soil borings. The samples were submitted to NET Laboratory in San Diego, California, and analyzed for organophosphate pesticides, chlorinated herbicides, RoundupTM, ParaquatTM, chlorinated pesticides and PCBs.

Laboratory analysis reported that concentrations of pesticides and PCBs were not present above method detection limits (MDL) in the two samples collected from the soil borings. Concentrations above the MDL were reported in the grab sample; however, these concentrations were below the Model Toxics Control Act (MTCA) Method B formula values for soil based on direct contact, and below soil concentrations protective of groundwater. The concentrations were also below the values listed in Table 749-2 of the MTCA Cleanup Regulation for protection of terrestrial and ecological receptors at sites that qualify for a simplified terrestrial ecological evaluation. Table 749-2 does not list a value for endosulfan; however, due to the low concentration of endosulfan present in site soils (31.3 µg/kg total), and because this concentration is also well below the lowest values listed in Table 749-2 for other pesticides (170 µg/kg for Aldrin and Dieldrin), the concentration of endosulfan present in site soil is considered to be protective of terrestrial ecological receptors. The laboratory results are summarized in Table 1.

CONCLUSIONS

Currently, the disposal site is fenced and is posted with signage that states dumping is prohibited. The surface of the disposal area is flat and covered with layer of compacted fine sand and gravel to limit infiltration and promote runoff away from the disposal area. The site surface is free of waste, and is monitored regularly to prevent dumping. If solid waste or household garbage is discovered at the site, it is removed and transported to a local licensed solid waste facility.

Based on laboratory analysis of soil samples collected for Ecology during the site hazard assessment, the concentrations of pesticides reported in shallow soil at the site are well below MTCA Method B formula values for soil based on direct contact, below concentrations considered protective of groundwater, and below the listed values for protection of terrestrial ecological receptors; therefore, a No Further Action determination for the site is appropriate.

If you have any questions regarding this letter, or if you need additional information, please don't hesitate to contact me at (509)-327-9737.

LANDAU ASSOCIATES, INC.

Thomas D. Briggs, P.E., L.G.

Senior Hydrogeologist

TDB/pcs

No. 971001.010.011

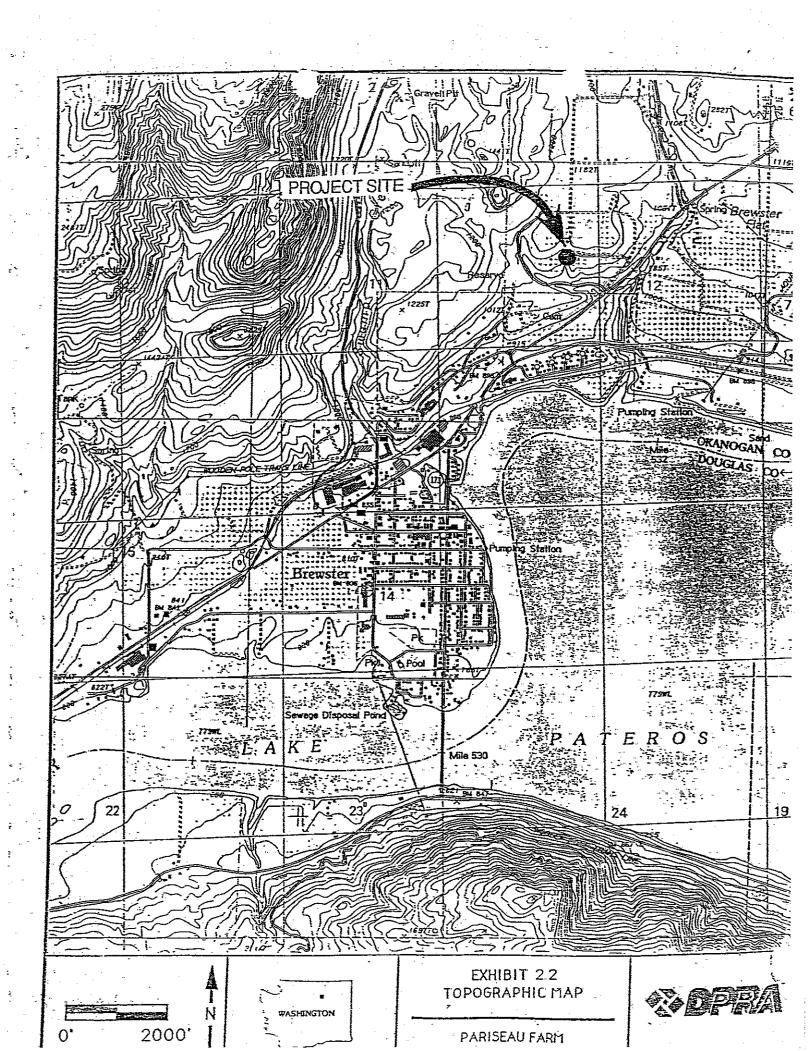
Attachments:

Exhibit 2.2 (SHA)

Table 1

Ecology VCP Forms

cc: Mr. Dan Gebbers



LABORATORY RESULTS PARISEAU FARMS DISPOSAL SITE Okanogan County, Washington TABLE 1

Page 1 of 1

	-								WEELON TO THE PERSON TO THE PE	. 2	
		Organophosph.	등					Endosulfan			
Sample Location	Date Sampled	Pesticides (mg/kg)	Herbicides (µg/kg)	PCB (µg/kg)	Paraquat (µg/kg)	Glyphosate (µg/kg)	4,4 DDE (μg/kg)	Sulfate (µg/kg)	Endosulfan-l (ug/kg)	Endosulfan-tl (uako)	Endrin (ua/ka)
PFB-01-005.0S	4/17/1991	QN	Q	2	1000 U	200 U	2.4 U	3.0	1	2.9 U	3.3 U
PFB-02-009,0S	4/17/1991	QX	8	S	1000	200.11	2311	18.6	0411	1120	2 0
PFG-01-001,0S	4/17/1991	2	£	2	10001	1 000	ο α ο α	, , , , ,	. a	7 4 6	יא פי פיא
				<u>.</u>	2	3	2	2	9	?). (a)
MTCA Method B S	MTCA Method B Soil Formula Value (a)				360,000	800,000	2,940	480,000(b)	480,000(b)	480,000(b)	24,000
Method B Soil (Protection of Groundwater)	tion of Groundwater)				SS	SN	450	4300(b)	4300(b)	4300(b)	440
Terrestrial I	Terrestrial Ecological Criteria (c)				NS	SN	1,000	9	Ð	(0)	400

Notes:

Analytical data from the Draft Site Hazard Assessment (SHA) Report, Pariseau and Gebbers Farm, Brewster, WA, May 1991

ND = Not Detected

NS = not specified.

µg/kg ≃ micrograms per kilogram.

mg/kg - milligrams per kilogram

(a) Method B soil formula value protective of direct human contact [Cleanup Levels and Risk Calculations (CLARC) (https://fortress.wa.gov/ecy/clarc/CLARCHome.aspx)]

(b) Value is for total endosulfan

(c) Model Toxics Control Act Cleanup Regulation Chapter 173-340 WAC, Table 749-2 (d) safe level not established